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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/088,281	03/13/2002	Naoki Hayashi	SIP1P049	8712
22434	7590	05/24/2005	EXAMINER	
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ART UNIT		PAPER NUMBER		
		1713		

DATE MAILED: 05/24/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	10/088,281	HAYASHI ET AL.
	Examiner	Art Unit
	Mei Q. Huang	1713

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 13 March 2002.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-5 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-5 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
2. Certified copies of the priority documents have been received in Application No. _____.
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 07/22/02.
- 4) Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) Notice of Informal Patent Application (PTO-152)
- 6) Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 1-3 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. In light of formulas (10) and (11) in the instant specification, page 7, line 9-10, it is not clear if formula (9) in the instant claim 1 should be $\text{CH}_2=\text{C}(\text{R}^{61})-\text{COO}-(\text{C}_\text{P}\text{H}_{2\text{P}}\text{O})_\text{r}$ or $\text{CH}_2=\text{C}(\text{R}^{61})-\text{COO}-(\text{C}_\text{P}\text{H}_{2\text{P}})_\text{r}$. For the purpose of examination, the examiner herein chooses the latter.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

4. Claims 1-3 are rejected under 35 U.S.C. 102(a) as being anticipated by Honda et al. (JP 10-282335).

The prior art to Honda et al. relates to a near infrared ray absorbing laminated plate which is especially suitable for a front sheet of a plasma display (Abstract), which reads on the instantly claimed optical filter. In the near infrared ray absorbing laminated plate, a polymer composition contains: a phosphor atom which is indicated by the

following formula, $(HO)_n-(PO)-(OR)_{3-n}$, wherein R is an alkyl group, an aralkyl group, or an alkenyl group, n is 1 or 2 and a compound containing copper ion (Abstract), which reads on the instantly claimed components (A) and (B). The copper-containing compounds are disclosed on page 4, [0022], such as copper acetate, formic-acid copper, etc. Honda et al. further teach that the copper ion content is 0.01 – 30 wt% (page 4, [0023]) with an amount of 2 wt% used in a working example (page 7, [0039]), which meets the instantly claimed range of 2-60 wt% for copper content. In addition, Honda et al. disclose that the Lynn (phosphorus) atom content is 0.05-10 mol per mol of copper atom (page 4, [0023]), which covers the instantly claimed range of 0.4-1.3 required by Claim 1 and 0.8-1.3 required by Claim 2.

As to Claim 3, a formula of $CH_2=C(X)COO(Y)_m$ which is (OR) in the general formula of $(HO)_n-(PO)-(OR)_{3-n}$ can be seen on page 3, [0019], wherein X is a hydrogen atom or methyl group, m is 1-20, and Y is oxyalkylene group with carbon numbers of 2-4. This appears to read on the instant claim 3.

In sum, all the limitations of Claims 1-3 are fully met by Honda et als' disclosure.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

7. Claims 4-5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Honda et al. (JP 10-282335) in view of Shouji et al. (U.S. Patent No. 5,611,965).

Honda et al. disclose a method of making the near infrared ray absorbing laminated plate on page 4, [0027]-[0028] to page 5, [0029], and page 7, [0039] involving making solution of the monomers, polymerization and dissolving copper compound. The difference between the prior art to Honda et al. and the present application is that Honda et al. do not specify that whether a solvent or water is used. However, using a solvent in making a solution or dissolving a compound is a common knowledge of technologists to one of ordinary skilled in the art. The prior art to Shouji et al. discloses an optical filter comprising a phosphorus-containing monomer and a copper compound (Abstract), which is substantially identical to the instantly claimed composition. A method of making the optical filter is illustrated in Example 1, column 6, line 65-67 and column 7, line 1-9. Shouji et al. also teach a process in which the copolymer is dissolved or dispersed in water or an organic solvent, and the metallic compound is added to this solution or dispersed to blend the resultant mixture (column 5, line 49-52). In light of Shouji et als' teaching of an organic solvent or water being used in making a

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similar composition as Honda et als', it would have been obvious to one having ordinary skill in the art at the time the invention was made to use water or an organic solvent, as taught by Shouji et al., in Honda et als' process in making a similar composition because using a solvent in making a solution or dissolving a compound is a common knowledge of technologists to one of ordinary skilled in the art.

Conclusion

The prior art made of record but not relied upon is considered pertinent to applicant's disclosure. The following references have been cited.

U.S. Patent No. 6,410,613 to Ohnishi et al.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mei Q. Huang whose telephone number is (571) 272-3549. The examiner can normally be reached on 8am - 4pm, Mon. - Fri..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

TATYANA ZALUKAEVA
PRIMARY EXAMINER



Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Mei Q. Huang
Examiner

May 19, 2005